

FIG. 1

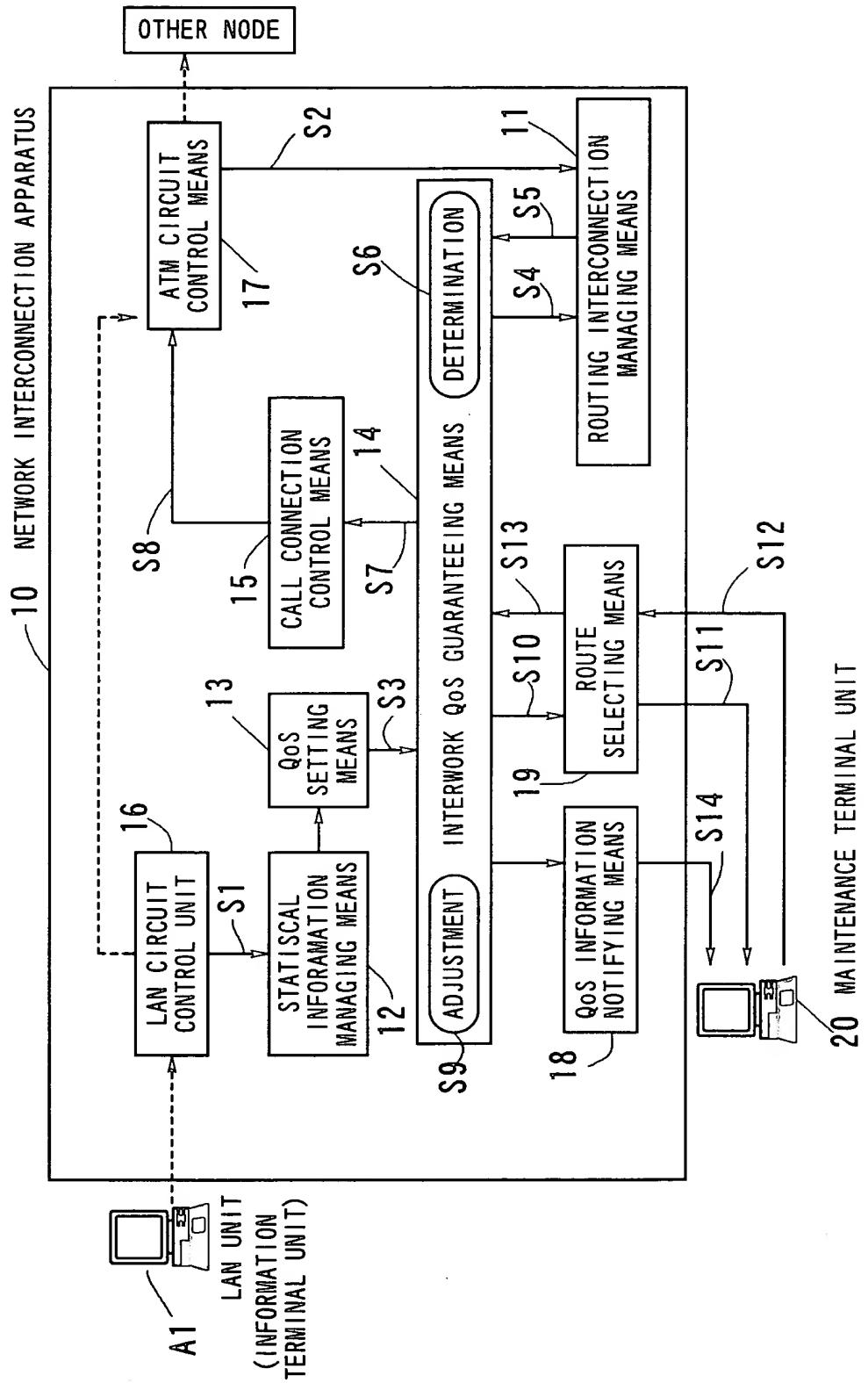


FIG. 2

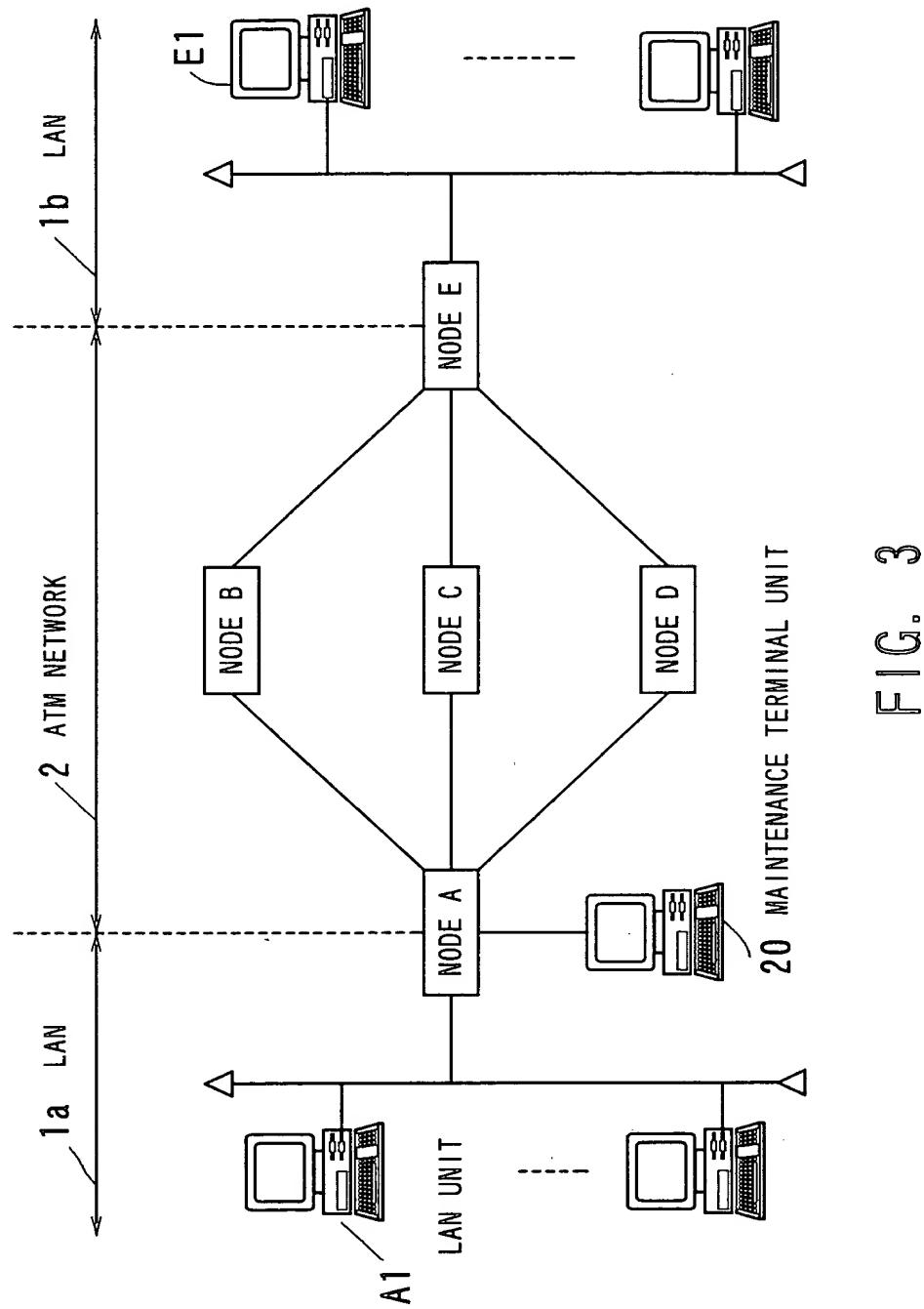


FIG. 3

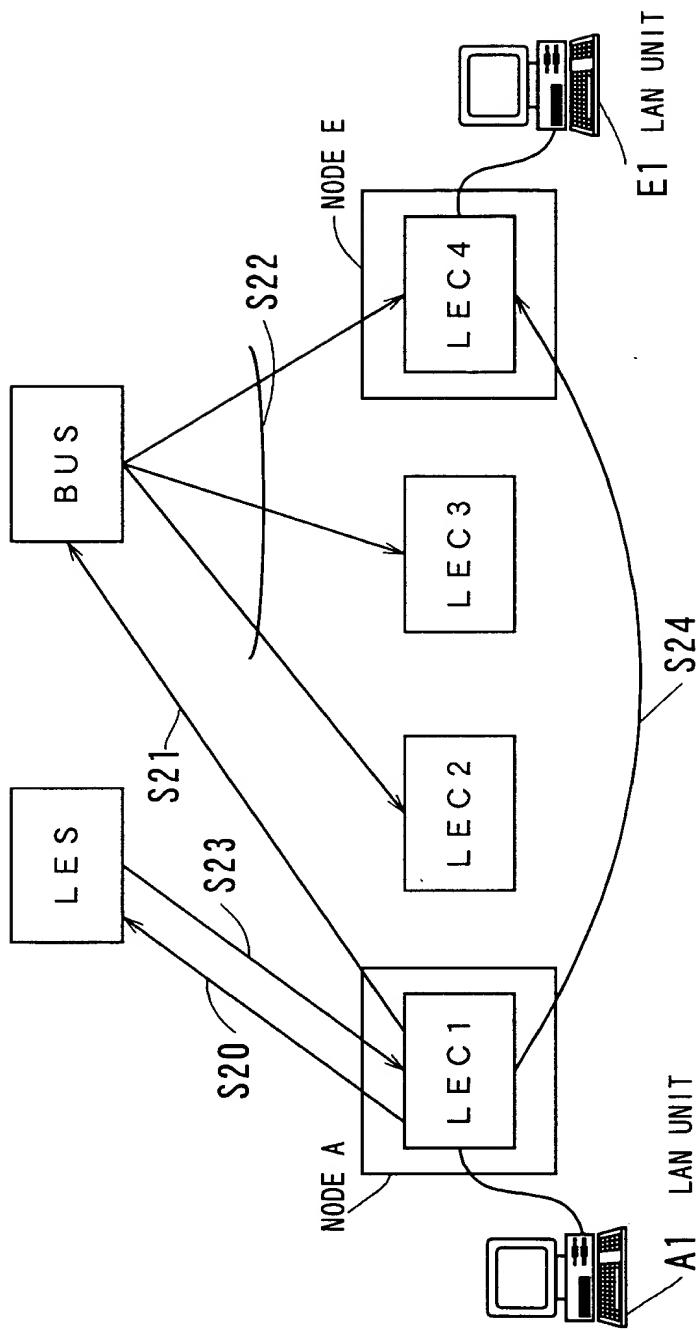


FIG. 4

11a STATICAL INFORMATION MANAGEMENT TABLE

TCP/IP CONNECTION IDENTIFIER	FIRST SAMPLING	SECOND SAMPLING	THIRD SAMPLING	FOURTH SAMPLING	FIFTH SAMPLING	AVERAGE TRAFFIC VOLUME
IDENTIFIER #1	19.2K	19.2K	19.2K	19.2K	19.2K	19.2K
IDENTIFIER #2	4.8M	4.8M	4.8M	4.8M	4.8M	4.8M
IDENTIFIER #3	240.0K	144.0K	5.76M	5.76M	9.60K	2.4M

(b p s)

FIG. 5

15a INFORMATION ELEMENT OF CALL CONNECTION REQUEST MESSAGE

INFORMATION ELEMENT	CONTENTS
ATM TRAFFIC DESCRIPTOR	PCR, SCR, MBS, ETC.
BROADBAND BEARER CAPABILITY	SERVICE CATEGORY, ETC.
DTL	ROUTING LIST, ETC.
CALLED PARTY NUMBER	TERMINATING ATM ADDRESS, ETC.
ETC.	-----

FIG. 6

13-1 QoS PARAMETERS

SERVICE CATEGORY	CBR (CONSTANT BIT RATE) VBR (VARIABLE BIT RATE)
BAND	PCR (PEAK CELL RATE) SCR (SUSTAINABLE CELL RATE) MBS (MAXIMUM BURST SIZE)
DELAY	CTD (CELL TRANSFER DELAY)
FLUCTUATION	CDV (CELL DELAY VARIATION)

FIG. 7

QoS PARAMETER SETTING INFORMATION

TCP/IP CONNECTION IDENTIFIER	SERVICE CATEGORY	PCR	SCR	MBS	CTD	CDV
IDENTIFIER #1	CBR	50cps			$\leq 20 \mu s$	ARBITRARY
IDENTIFIER #2	CBR	12500cps			$\leq 20 \mu s$	ARBITRARY
IDENTIFIER #3	VBR	15000cps	6250cps	30000 CELLS	ARBITRARY	$\leq 4 \mu s$

13a

13c

FIG. 8

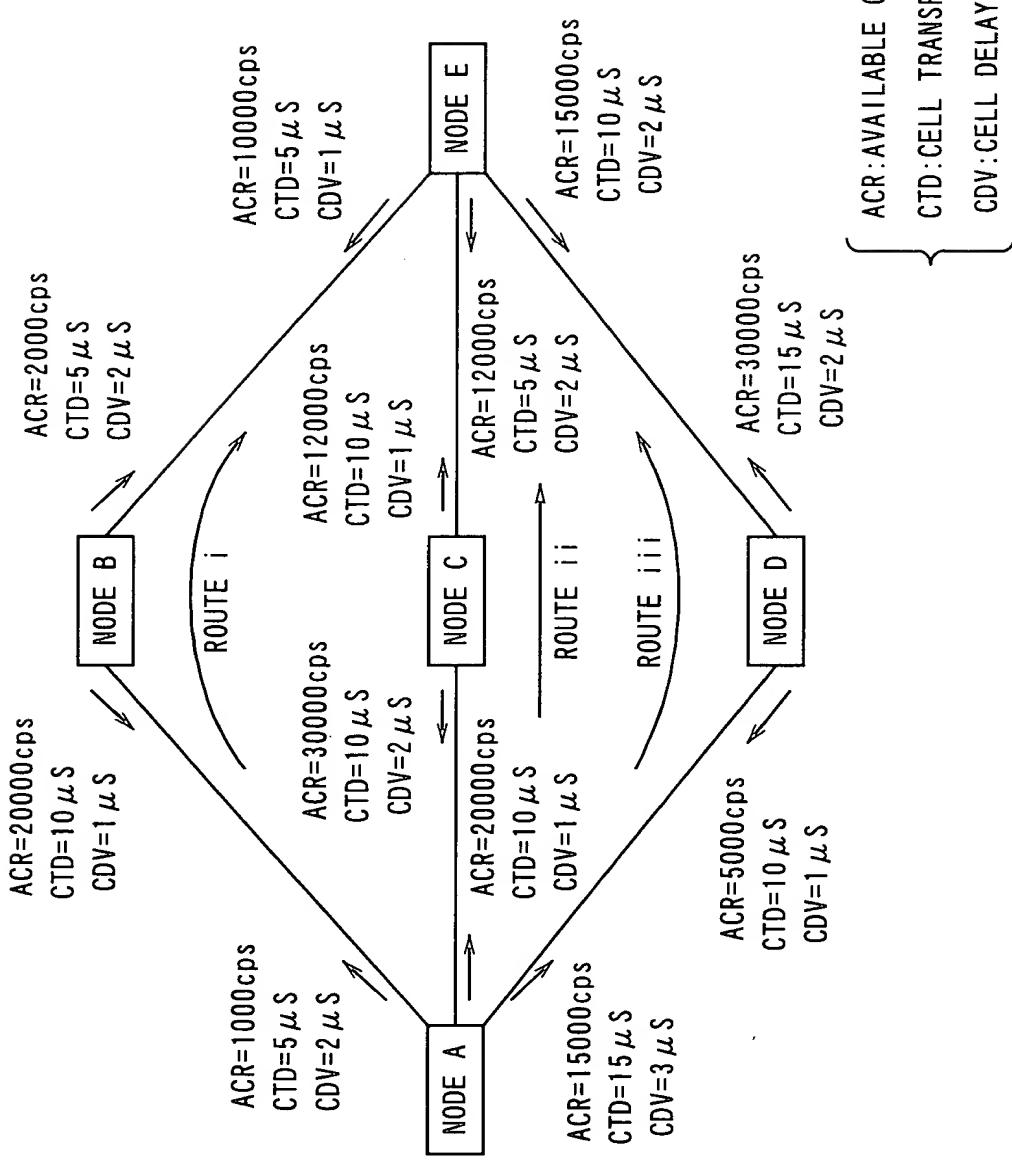


FIG. 9

12a DTL TABLE

ROUTE	ROUTING LIST	ACR	CTD	CDV
i	A → B → E	1 0 0 0 c p s	1 0 μ s	4 μ s
ii	A → C → E	1 2 0 0 0 c p s	2 0 μ s	2 μ s
iii	A → D → E	1 5 0 0 0 c p s	3 0 μ s	5 μ s

FIG. 10

15b INFORMATION ELEMENTS OF CALL CONNECTION REQUEST MESSAGE
(FIRST EMBODIMENT)

INFORMATION ELEMENT	CONTENTS
ATM TRAFFIC DESCRIPTOR	PCR=50 cps
BROADBAND BEARER CAPABILITY	SERVICE CATEGORY=CBR
DTL	ROUTING LIST=A → B → E
CALLED PARTY NUMBER	TERMINATING ATM ADDRESS=ATM ADDRESS OF NODE E

FIG. 11

15c CALL CONNECTION REQUEST PARAMETERS
(SECOND EMBODIMENT)

INFORMATION ELEMENT	CONTENTS
ATM TRAFFIC DESCRIPTOR	PCR=50 cbs, SCR=6250 cbs, MBS=37500 CELLS
BROADBAND BEARER CAPABILITY	SERVICE CATEGORY=CBR
DTL	ROUTING LIST=A → C → E
CALLED PARTY NUMBER	TERMINATING ATM ADDRESS=ATM ADDRESS OF NODE E

FIG. 12

18a QoS INFORMATION

QoS REQUESTED FIRST BUT FAILED TO BE GUARANTEED	SERVICE CATEGORY=VBR PCR=15000 cps SCR=6250 cps MBS=30000 CELLS CTD=ARBITRARY CDV=4 μ s OR LESS
REASON FOR FAILURE TO GUARANTEE	BAND DEFICIENCY OF ROUTE i & BAND DEFICIENCY OF ROUTE ii & CDV OF ROUTE iii
OPTIMUM QoS AFTER ADJUSTMENT (GUARANTEED QoS)	SERVICE CATEGORY=VBR PCR=12000 cps SCR=6250 cps MBS=37500 CELLS CTD=ARBITRARY CDV=4 μ s OR LESS

FIG. 13

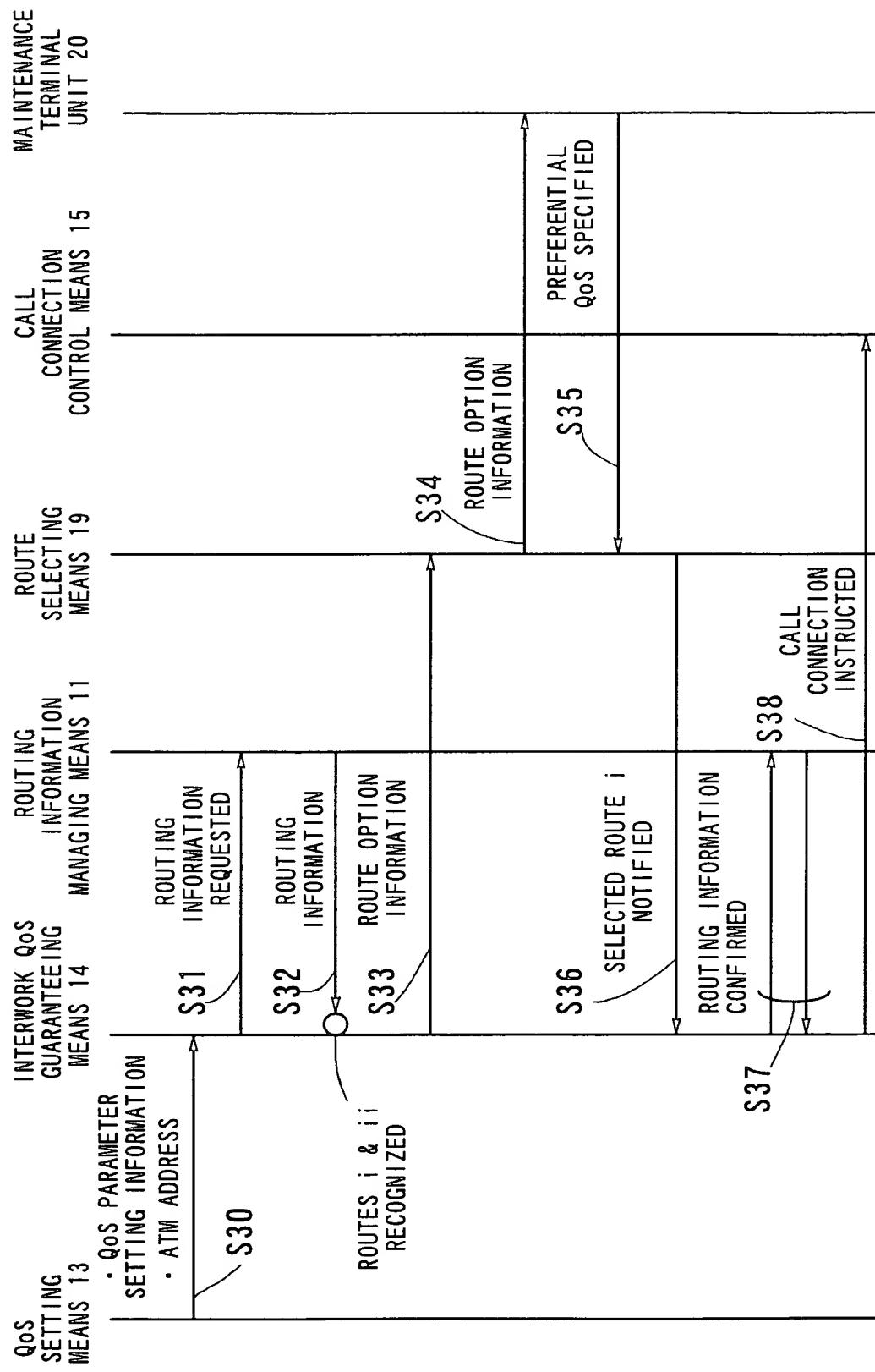


FIG. 14

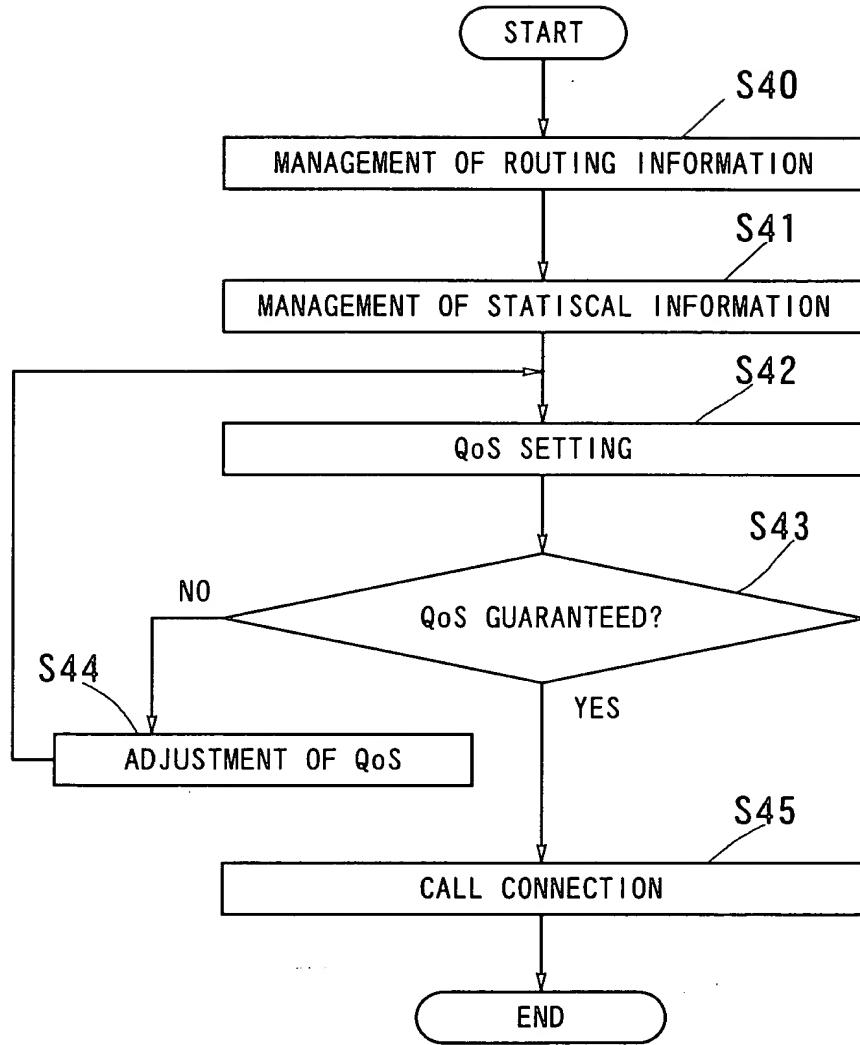


FIG. 15